

Applicant : Mihrimah Ozkan et al.  
Serial No.: 09/917,139  
Filed : July 26, 2001  
Page : 2 of 15

Attorney's Docket No.: 15670-036001  
/SD2001-014-2

Amendments to the Specification:

Please replace the paragraph beginning at page 17, line 26 with the following amended paragraph:

This could be achieved by using various types of optical setup. Figure 7 shows the preferred optical setup with laser light emissions from VCSEL array 71 being first focused in a microlens array 72 and then by lens 73 to become focused on an object 74 (object 74 is not part of the apparatus of the invention). A practitioner of the optical engineering arts will recognize that, ~~[[it]]~~ in accordance with the principle of optics, the VCSEL array of Figure 5 can be variously scaled in number and in size, and adapted as a laser light source in the optical tweezers 6 of Figure 6.

Please replace the paragraph beginning at page 23, line 10 with the following amended paragraph:

One or more objects to be manipulated are contained, normally in a liquid solution, between electrode plates 141,142, at least ~~[[a]]~~ one of which plates (plate 141) through which (preferably) a VCSEL-driven micro beam 143 is passed being transparent to his micro-beam 143. Either substrate, and most normally the substrate 142, may be patterned, as illustrated, to facilitate placement, and retention in position, of objects

Applicant : Mihrimah Ozkan et al.  
Serial No.: 09/917,139  
Filed : July 26, 2001  
Page : 3 of 15

Attorney's Docket No.: 15670-036001  
/SD2001-014-2

variously moved by both electrical force, as is produced between the electrodes 141,142 and optical force, as is produced by the VCSEL-driven micro beam 143.